

Access DB# 153862

SEARCH REQUEST FORM

Scientific and Technical Information Center

Requester's Full Name: DAWN GARRETT Examiner #: 76107 Date: 5/17/2005
Art Unit: 1774 Phone Number 2-1523 Serial Number: 10/729,245
Mail Box and Bldg/Room Location: Remsen 10C79 Results Format Preferred (circle): PAPER DISK E-MAIL

If more than one search is submitted, please prioritize searches in order of need.

Please provide a detailed statement of the search topic, and describe as specifically as possible the subject matter to be searched. Include the elected species or structures, keywords, synonyms, acronyms, and registry numbers, and combine with the concept or utility of the invention. Define any terms that may have a special meaning. Give examples or relevant citations, authors, etc, if known. Please attach a copy of the cover sheet, pertinent claims, and abstract.

Title of Invention: Organic Electroluminescent Devices

Inventors (please provide full names): _____

J. VARGAS, JOSEPH DEATONEarliest Priority Filing Date: 12/5/03

For Sequence Searches Only Please include all pertinent information (parent, child, divisional, or issued patent numbers) along with the appropriate serial number.

SCIENTIFIC REFERENCE BR
Sci & Tech Info Ctr
MAY 19 2005
Pat. & T.M. Office

Please search

formula (1) shown in claim 8,
formula (1a) shown in claim 12, and
formulas Inv-1 through Inv-21
shown in claim 22

STAFF USE ONLY

	Type of Search	Vendors and cost where applicable
Searcher: <u>ESJ</u>	NA Sequence (#) _____	STN _____
Searcher Phone #: _____	AA Sequence (#) _____	Dialog _____
Searcher Location: _____	Structure (#) _____	Questel/Orbit _____
Date Searcher Picked Up: _____	Bibliographic _____	Dr.Link _____
Date Completed: <u>5-26-05</u>	Litigation _____	Lexis/Nexis _____
Searcher Prep & Review Time: _____	Fulltext _____	Sequence Systems _____
Clerical Prep Time: _____	Patent Family _____	WWW/Internet _____
Online Time: _____	Other _____	Other (specify) _____

=> file reg

FILE 'REGISTRY' ENTERED AT 12:15:11 ON 26 MAY 2005
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
COPYRIGHT (C) 2005 American Chemical Society (ACS)

=> d his

FILE 'HCAPLUS' ENTERED AT 11:48:59 ON 26 MAY 2005

L1 3421 S VARGAS ?/AU
L2 368 S DEATON ?/AU
L3 0 S L1 AND L2

FILE 'LREGISTRY' ENTERED AT 11:49:53 ON 26 MAY 2005

L4 STR

FILE 'REGISTRY' ENTERED AT 11:51:42 ON 26 MAY 2005

L5 50 S L4
L6 STR L4
L7 50 S L6
L8 SCR 1933
L9 50 S L6 NOT L8
L10 SCR 1838
L11 50 S L6 AND L10 NOT L8
L12 STR L6
L13 26 S L12 AND L10 NOT L8
L14 404 S L12 AND L10 NOT L8 FUL
SAV L14 GAR245/A
L15 181 S L14 AND 4/ELC.SUB

FILE 'HCA' ENTERED AT 12:03:28 ON 26 MAY 2005

L16 158 S L15
L17 92606 S (ELECTROLUM!N? OR ORGANOLUM!N? OR (ELECTRO OR ORGANO OR
L18 0 S L16 AND L17
L19 228 S L14
L20 1 S L19 AND L17
L21 433014 S PHOSPHOR# OR PHOSPHORES? OR FLUORES? OR ELECTROPHOSPHOR
L22 1 S L16 AND L21
L23 2 S L19 AND L21
L24 2 S L20 OR L22 OR L23
L25 157 S L16 NOT L24

FILE 'REGISTRY' ENTERED AT 12:15:11 ON 26 MAY 2005

=> d l14 que stat

L8 SCR 1933

L10 SCR 1838

L12 STR

```

      4
      N
      |
      * 2
N --- B --- N
1  E0  3

```

NODE ATTRIBUTES:

HCOUNT IS E0 AT 2
 NSPEC IS RC AT 1
 NSPEC IS RC AT 3
 NSPEC IS RC AT 4
 CONNECT IS E3 RC AT 2
 DEFAULT MLEVEL IS ATOM
 DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

RING(S) ARE ISOLATED OR EMBEDDED
 NUMBER OF NODES IS 4

STEREO ATTRIBUTES: NONE

L14 404 SEA FILE=REGISTRY SSS FUL L12 AND L10 NOT L8

100.0% PROCESSED 18454 ITERATIONS
 SEARCH TIME: 00.00.01

404 ANSWERS

=> file hca

FILE 'HCA' ENTERED AT 12:15:28 ON 26 MAY 2005

USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.

PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

COPYRIGHT (C) 2005 AMERICAN CHEMICAL SOCIETY (ACS)

=> d l24 1-2 all hitstr

L24 ANSWER 1 OF 2 HCA COPYRIGHT 2005 ACS on STN

AN 141:40540 HCA

ED Entered STN: 08 Jul 2004

TI A solid film lubricant system useful in antifriction coatings on
 metal, ceramic or plastic surfaces

IN Kraaijenbrink, Roeland Maarten; Nelissen, Johan Wilhelmus Antonius;

Tomaszewski, Karl Heinz Juergen; Woydt, Mathias
 PA TE Strake Surface Technology B.V., Neth.
 SO Eur. Pat. Appl., 8 pp.
 CODEN: EPXXDW
 DT Patent
 LA English
 IC ICM C10M103-00
 ICS C10M169-04
 CC 51-8 (Fossil Fuels, Derivatives, and Related Products)
 Section cross-reference(s): 38, 56, 57

FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 1431378	A1	20040623	EP 2003-79003	20031219
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
NL 1022223	C2	20040622	NL 2002-1022223	20021220

PRAI NL 2002-1022223 A 20021220

CLASS

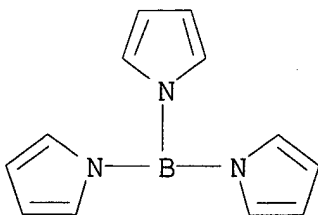
PATENT NO.	CLASS	PATENT FAMILY CLASSIFICATION CODES
EP 1431378	ICM	C10M103-00
	ICS	C10M169-04
EP 1431378	ECLA	C10M103/00; C10M169/04
NL 1022223	ECLA	C10M103/00; C10M169/04

AB The object of the invention is to provide a lubricant system which enables the prepn. of tailor-made antifriction coatings for industrial application through careful selection of the suitable solid lubricant components. The invention relates to a solid film lubricant system useful in coating a metal, ceramic, or polymeric material wear surface, comprising (a) a carrier, (b) solid lubricant components, (c) additives. Solid lubricant components are selected from $Zr(OH)_4$, $Zr(OH)_2 \cdot nH_2O$, $ZrO_2 \cdot nH_2O$, Bi_2S_3 , graphite intercalation compds., graphite inhibited compds., phyllosilicates, and CeF_3 , or a combination thereof. The carrier is selected from polymineral resins, aniline resins, **phosphor** and boron modified phenolic resins, polyaniline resins, from polyazoles, as polybenzimidazole, polypyrrolone, polyimidazolepyrrolone, poly-p-phenylene, poly-p-xylene, poly-m-phenyleneisophthalamide, polyphenylenebenzoxazole, polyphenylenebenzothiazole, poly-tris(N-pyrrolyl) boron resins, polycarbosilanes, and polysilanes, as well as the mixts. thereof. Said

graphite-inhibiting compds. are selected from FeCl_3 , CuFeS_2 , Fe_2PO_5 , AsF_5 , NiCl_2 , CaF_2 , BaF_2 , LiF , AgCl , AgF , SbF_5 , AlCl_3 , CuCl_2 , CoCl_2 , MnCl_2 , MoCl_5 , SbCl_3 , SbCl_5 , and hydrated compds. thereof added to improve the antifriction properties of graphite. The graphite intercalation compds. and graphite inhibited compds. are protected against oxidn. by adding thereto [CS]-surface complexes, $\text{Zn}_3\text{P}_2\text{O}_5$, zinc ortho phosphate, KH_2PO_4 , AlPO_4 and $\text{Li}_2\text{OMgOP}_2\text{O}_5$, or a mixt. thereof. Such antifriction coatings, being high-grade lubricants, generally provide maintenance-free, permanent lubrication, and they are capable of meeting extreme requirements which the usual lubricants cannot meet.

- ST solid film lubricant antifriction coating metal ceramic plastic
- IT Polyanilines
 - (additive and carrier; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Ceramics
 - (antifriction coating for; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Metals, uses
 - Plastics, uses
 - (antifriction coating for; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Coating materials
 - (antifriction; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Polybenzimidazoles
- IT Polycarbosilanes
- IT Polysilanes
 - (carrier; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Polypyrrones
 - (imidazole contg. carrier; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Phenolic resins, uses
 - (**phosphor** and boron modified; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Resins
 - (polymineral resins; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Phyllosilicate minerals
- IT Serpentine-group minerals
 - (solid lubricant component; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT Lubricants
 - (solid; solid film lubricant system useful in antifriction coatings on metal, ceramic or plastic surfaces)
- IT 7778-77-0, Potassium phosphate (KH_2PO_4) 7779-90-0, Zinc ortho

- phosphate 7784-30-7, Aluminum phosphate (AlPO_4) . 114041-10-0
(antioxidant; solid film lubricant system useful in antifriction
coatings on metal, ceramic or plastic surfaces)
- IT **18899-90-6D**, derivs., polymers 24938-60-1,
Poly-m-phenyleneisophthalamide 25035-33-0 25190-62-9,
Poly-p-phenylene 25951-90-0, Poly-p-xylene 60871-72-9
69794-31-6
(carrier; solid film lubricant system useful in antifriction
coatings on metal, ceramic or plastic surfaces)
- IT 7446-70-0, Aluminum chloride (AlCl_3), uses 7447-39-4, Copper
chloride (CuCl_2), uses 7646-79-9, Cobalt chloride (CoCl_2), uses
7647-18-9, Antimony chloride (SbCl_5) 7705-08-0, Iron chloride
(FeCl_3), uses 7718-54-9, Nickel chloride (NiCl_2), uses
7773-01-5, Manganese chloride (MnCl_2) 7775-41-9, Silver fluoride
(AgF) 7783-70-2, Antimony fluoride (SbF_5) 7783-90-6, Silver
chloride (AgCl), uses 7784-36-3, Arsenic fluoride (AsF_5)
7787-32-8, Barium fluoride (BaF_2) 7789-24-4, Lithium fluoride
(LiF), uses 7789-75-5, Calcium fluoride (CaF_2), uses 10025-91-9,
Antimony chloride (SbCl_3) 10241-05-1, Molybdenum chloride (MoCl_5)
12015-76-8, Copper iron sulfide (CuFeS_2) 81208-51-7, Iron
phosphate (Fe_2PO_5)
(graphite inhibited compd.; solid film lubricant system useful in
antifriction coatings on metal, ceramic or plastic surfaces)
- IT 1314-23-4, Zirconium oxide (ZrO_2), uses 1345-07-9, Bismuth sulfide
(Bi_2S_3) 7758-88-5, Cerium fluoride (CeF_3) 7782-42-5, Graphite,
uses 14475-63-9, Zirconium hydroxide ($\text{Zr}(\text{OH})_4$) 42037-27-4,
Zirconium hydroxide ($\text{Zr}(\text{OH})_2$)
(solid lubricant component; solid film lubricant system useful in
antifriction coatings on metal, ceramic or plastic surfaces)
- IT **18899-90-6D**, derivs., polymers
(carrier; solid film lubricant system useful in antifriction
coatings on metal, ceramic or plastic surfaces)
- RN 18899-90-6 HCA
CN 1H-Pyrrole, 1,1',1''-borylidynetris- (9CI) (CA INDEX NAME)



TI **Electroluminescent** material
 IN Kathirgamanathan, Poopathy
 PA South Bank University Enterprises Ltd., UK
 SO PCT Int. Appl., 39 pp.
 CODEN: PIXXD2
 DT Patent
 LA English
 IC ICM C09K011-06
 ICS H05B033-14
 CC 73-11 (Optical, Electron, and Mass Spectroscopy and Other Related Properties)
 Section cross-reference(s): 76, 78

FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9858037	A1	19981223	WO 1998-GB1773	19980617
W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, GM, GW, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
CA 2293532	AA	19981223	CA 1998-2293532	19980617
AU 9881165	A1	19990104	AU 1998-81165	19980617
AU 741025	B2	20011122		
EP 990016	A1	20000405	EP 1998-930877	19980617
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
JP 2002505701	T2	20020219	JP 1999-503979	19980617
US 6524727	B1	20030225	US 1999-466523	19991217
PRAI GB 1997-12483	A	19970617		
WO 1998-GB1773	W	19980617		

CLASS

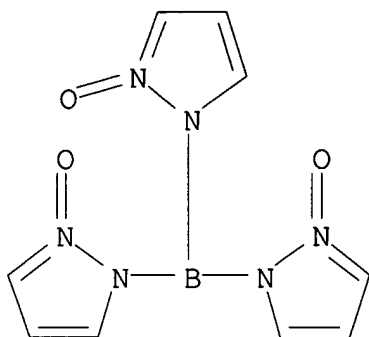
PATENT NO.	CLASS	PATENT FAMILY CLASSIFICATION CODES
WO 9858037	ICM	C09K011-06
	ICS	H05B033-14
WO 9858037	ECLA	C09K011/06; H05B033/14
US 6524727	NCL	428/690.000; 252/301.160; 252/301.260; 257/040.000; 257/103.000; 313/504.000; 313/506.000; 428/704.000; 428/917.000
	ECLA	C09K011/06; H05B033/14
OS	MARPAT 130:102684	
AB	Electroluminescent devices comprising a transparent substrate on which is formed a layer of an electroluminescent material are described in which the electroluminescent material is a rare earth metal, actinide or transition metal org. complex which has a photoluminescent efficiency (PL) >25%, preferably >40%. Electroluminescent complexes are also described. in which the metal is a rare earth, transition metal, lanthanide, or an actinide and .gtoreq.1 of the ligands is either O-C(R')-C(R'')-C(R')-O or a 2,2'-Bis(pyridyl)ketone deriv. (R' = (un)substituted arom. or heterocyclic ring structures, a hydrocarbyl of a fluorocarbon, or tert-butyl; and R'' = (un)substituted arom. or heterocyclic ring structures, a hydrocarbyl of a fluorocarbon, F, or H, or can be part of a copolymer). Preferably, the metals are selected from Sm(III), Eu(III), Tb(III), Dy(III), Yb(III), Lu(III), Gd (III), Eu(II), U(III), UO ₂ (VI), and Th(III).	
ST	electroluminescent device metal complex; material electroluminescent metal complex	
IT	Actinide compounds (complexes; electroluminescent materials based on metal complexes and devices using them)	
IT	Electroluminescent devices (electroluminescent materials based on metal complexes and devices using them)	
IT	Rare earth complexes Transition metal complexes (electroluminescent materials based on metal complexes and devices using them)	
IT	Phosphors (electroluminescent ; electroluminescent materials based on metal complexes and devices using them)	
IT	Polyanilines (hole transport material; electroluminescent materials based on metal complexes and devices using them)	
IT	7429-90-5, Aluminium, uses 7439-93-2, Lithium, uses 7439-95-4, Magnesium, uses 7440-70-2, Calcium, uses 37271-44-6 (anode; electroluminescent materials based on metal	

- complexes and devices using them)
- IT 50926-11-9, Indium tin oxide
(cathode; **electroluminescent** materials based on metal complexes and devices using them)
- IT 1118-71-4D, terbium-dipyrazolyl oxide borate and terbium-tripyrzazolyl oxide borate complexes 7439-94-3D, Lutetium, complexes, uses 7440-19-9D, Samarium, complexes, uses 7440-27-9D, Terbium, dipivaloylmethane-dipyrazolyl oxide borate and dipivaloylmethane-tripyrzazolyl oxide borate complexes, uses 7440-29-1D, Thorium, complexes, uses 7440-54-2D, Gadolinium, complexes, uses 7440-61-1D, Uranium, complexes, uses 7440-64-4D, Ytterbium, complexes, uses 20219-51-6 **219121-79-6D**, terbium dipivaloylmethane complexes 219121-80-9D, terbium dipivaloylmethane complexes 219136-83-1 219136-85-3 219136-89-7 219136-94-4 219136-98-8 219137-01-6 219137-06-1
(**electroluminescent** materials based on metal complexes and devices using them)
- IT 156915-57-0P 156952-11-3P 156952-13-5P 203806-96-6P
219121-71-8P 219121-72-9P 219121-73-0P 219121-74-1P
219121-75-2P 219121-76-3P 219121-78-5P
(**electroluminescent** materials based on metal complexes and devices using them)
- IT 541-09-3, Uranyl acetate 1662-01-7, 4,7-Diphenyl-1,10-phenanthroline 2156-69-6 14552-07-9 15522-69-7 19437-26-4, Di-(2-pyridyl) ketone 31239-06-2, Imidotetraphenyldiphosphinic acid 218917-64-7 218917-67-0 218917-70-5 219144-50-0
(**electroluminescent** materials based on metal complexes and devices using them)
- IT 15492-51-0P
(**electroluminescent** materials based on metal complexes and devices using them)
- IT 2085-33-8, Tris(8-hydroxyquinolinato)aluminum 15082-28-7
(electron-injecting material; **electroluminescent** materials based on metal complexes and devices using them)
- IT 25067-59-8, Poly(vinylcarbazole) 25233-30-1, Polyaniline 65181-78-4, N,N'-Diphenyl-N,N'-bis(3-methylphenyl)-1,1'-biphenyl-4,4'-diamine
(hole transport material; **electroluminescent** materials based on metal complexes and devices using them)

RE.CNT 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD
RE

- (1) Amersham Int Plc; EP 0556005 A 1993 HCA
- (2) Amersham Int Plc; EP 0744451 A 1996 HCA
- (3) Dirr, S; International Conference on Electroluminescence of Molecular Materials and Related Phenomena 1997, V91(1-3), P53 HCA
- (4) Greenham, N; Chemical Physics Letters 1995, V241(1-2), P89
- (5) Junji, K; US 5128587 A 1992 HCA
- (6) Kido, J; Japanese Journal Appl Phys V35(3B), PL394 HCA

- (7) Kido, J; Japanese Journal of Applied Physics, Part 2 (Letters) 1996
(8) Lin, L; International Conference on Electroluminescence of Molecular Materials and Related Phenomena 1997, V91(1-3), P267
IT **219121-79-6D**, terbium dipivaloylmethane complexes
(**electroluminescent** materials based on metal complexes
and devices using them)
RN 219121-79-6 HCA
CN 1H-Pyrazole, 1,1',1''-borylidynetris-, 2,2',2''-trioxide (9CI) (CA
INDEX NAME)



- TI Synthesis, structures and reactivity of N-borane-protected 1,1'-bisimidazoles with different bridging functions
- L25 ANSWER 8 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Chemistry of boron, 250. Triaminoboranes and their metallation to N-lithiotriaminoboranes
- L25 ANSWER 9 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Tetra(pyrrolidino)diborane(4), [(C₄H₈N)₂B]₂, as a new improved alternative synthetic route to bis(pinacolato)diborane(4) - crystal structures of the intermediates
- L25 ANSWER 10 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Alkali metal reduction of 2-halogeno- and 2-thiolato-2,3-dihydro-1H-1,3,2-diazaboroles
- L25 ANSWER 11 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Addition Reactions of Bis(pinacolato)diborane(4) to Carbonyl Enones and Synthesis of (pinacolato)₂BCH₂B and (pinacolato)₂BCH₂CH₂B by Insertion and Coupling
- L25 ANSWER 12 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Aluminum containing species formed in reduction processes of sec-amino(dihalogeno)boranes with LiAlH₄
- L25 ANSWER 13 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Highly Energetic Tetraazidoborate Anion and Boron Triazide Adducts
- L25 ANSWER 14 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Reaction of 2,3-Dihydro-1H-1,3,2-diazaboroles and Diphenylketene: A Novel Synthesis of 1,3,2-Oxazaborolidines
- L25 ANSWER 15 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Synthesis, structure, and reactivity of 2-amino- and 2-imino-2,3-dihydro-1H-1,3,2-diazaboroles
- L25 ANSWER 16 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Cyclic ketiminoboranes
- L25 ANSWER 17 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Secondary nonaqueous electrolyte batteries
- L25 ANSWER 18 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Molecular structures of tri-N-pyrrolylboranes and the dynamic behavior of tri-N-indolylboranes in solution
- L25 ANSWER 19 OF 157 HCA COPYRIGHT 2005 ACS on STN
- TI Diazidoboranes

- L25 ANSWER 20 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Contribution to the chemistry of boron. 222. Chemistry of diborane(4) derivatives: mixed tetraaminodiboranes(4) and additions of diborane(4) derivatives to an amino-imino-borane
- L25 ANSWER 21 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Reactions of pyridine-bases with Na/K-alloy and diorganoaminodifluoroboranes
- L25 ANSWER 22 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Contributions to the chemistry of boron. 216. On the complex formation of 1,3,2,4-diphosphadiboretanes with pentacarbonylchromium and the preparation and reactivity of borylidenephosphine complexes
- L25 ANSWER 23 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Metal polypyrazolylborates. IV. Mercury derivatives
- L25 ANSWER 24 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Reactions of diisopropylcarbodiimide with dehalogenation products of (diisopropylamino)difluoroborane
- L25 ANSWER 25 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. 126. N-triazolylboranes
- L25 ANSWER 26 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Chemistry of boron. 199. Reactions of an amino-imino-borane with anilines and carboxylic acid amides
- L25 ANSWER 27 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI 1,3-Dihydro-1,3,2-diazaborole and 1,3,2-diazaborolidine compounds from alkali metal complexes of aromatic nitrogen heterocycles and dichloro(diisopropylamino)borane
- L25 ANSWER 28 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Aminoborane polymers as precursors of carbon-nitrogen-boron
- L25 ANSWER 29 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Novel iminoboranes and their reactions
- L25 ANSWER 30 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Manufacture of boron nitride ceramic articles from organic polymers
- L25 ANSWER 31 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Chemistry of silicon-nitrogen compounds. 163. Investigation of some compounds with boron-nitrogen-silicon structure fragments
- L25 ANSWER 32 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Borylated carbodiimides

L25 ANSWER 33 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Long-range nuclear spin-spin coupling between boron-11 and carbon-13, silicon-29 or tin-119: a promising tool for structural assignment

L25 ANSWER 34 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Organoboron compounds. XXX. Polycyclic borazines

L25 ANSWER 35 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Multinuclear magnetic resonance study (boron-11, carbon-13, nitrogen-14, nitrogen-15, silicon-29, phosphorus-31, tin-119, lead-207 NMR) of some N-pyrrolyl derivatives

L25 ANSWER 36 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Natural-abundance nitrogen-15 NMR of amine-borane adducts and correlation of $1J(\text{nitrogen-15-boron-11})$ with $1J(\text{phosphorus-31-boron-11})$ in phosphine-borane adducts

L25 ANSWER 37 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Aminohaloborane in organic synthesis. X. A convenient, economical exclusive ortho substitution reaction of N-alkyl and N-aminoalkyl anilines

L25 ANSWER 38 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Chemistry of boron. 161. Reactions of protic reagents with (tert-butylimino)(2,2,6,6-tetramethylpiperidino)borane

L25 ANSWER 39 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Three-membered boron-nitrogen heterocycles: amino derivatives of 1,2-diaza-3-boririne- and 1-aza-2,3-diboracyclopropane

L25 ANSWER 40 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Preparation and characterization of salts containing cations of tricoordinate boron

L25 ANSWER 41 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Chemistry of boron, 139. Addition compounds of alkylhaloboranes with 1,3,2-diazaborolidines: structure, stability, and exchange reactions

L25 ANSWER 42 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Unusual, thermally stable, sublimable (arylamino)dihaloboranes or -diaminoboranes: x-ray crystal structure of bis(amino)(2,4,6-tri-tert-butylphenylamino)borane

L25 ANSWER 43 OF 157 HCA COPYRIGHT 2005 ACS on STN

- TI Contributions to the chemistry of boron. 133. Molecular and crystal structure of tris(methylanilido)borane
- L25 ANSWER 44 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI NMR spectra of pyrazole derivatives of boron
- L25 ANSWER 45 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. XCVIII. Preparation and reactions of 2-(azol-1'-yl)-1,3,2-diazaboracycloalkanes
- L25 ANSWER 46 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. XCVI. Studies of the chemical behavior of monomeric pyrazol-1-ylboranes
- L25 ANSWER 47 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Diphenylamine.cntdot.borane, a new stable amine.cntdot.borane with remarkable hydroborating and reducing properties
- L25 ANSWER 48 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. 94. Reactions of dimethylaminoboranes with pyrazole
- L25 ANSWER 49 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron imides and borylnitrenes by decomposition of diaminoazidoboranes
- L25 ANSWER 50 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. LXXXIX. New boron derivatives of pyrazole and imidazole
- L25 ANSWER 51 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. Part 91. Some boron derivatives of pyrroles
- L25 ANSWER 52 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI NMR spectroscopic studies of boron compounds. XIX. Carbon-13 NMR studies on monoaminoboranes and borazines
- L25 ANSWER 53 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. 90. Symmetrical cleavage and some new derivatives of pyrazabole
- L25 ANSWER 54 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI The vibrational spectra of some 1,3-dimethyl-1,3-diaza-2-boracyclopentanes
- L25 ANSWER 55 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Assignment of vibrational spectra of some dialkylamido derivatives

of boron

- L25 ANSWER 56 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. LXXXVII. 1,3-Dimethyl-2-(pyrazol-1'-yl)-1,3,2-diazaboracyclohexane, a monomeric pyrazol-1-ylborane containing trigonal boron
- L25 ANSWER 57 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI The use of MINDO/3 parameters in the calculation of boron and fluorine chemical shifts
- L25 ANSWER 58 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds, Part 79. The reaction of 2-methylthio-1,3,2-diazaboracycloalkanes with anhydrous ammonia
- L25 ANSWER 59 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Reaction of metal and metalloid compounds with polyfunctional molecules. XXIII. Synthesis of asymmetric mono-, bis-, and trisaminoboranes
- L25 ANSWER 60 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Calculation of some boron nuclear screening constants
- L25 ANSWER 61 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. LXVII. Study of mixed aminohydrazinoboranes
- L25 ANSWER 62 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. LXVIII. Nuclear magnetic resonance spectroscopic studies on 1,3,2-diazaboracycloalkanes and phenylborane derivatives
- L25 ANSWER 63 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Tris(N-methylanilino)borane
- L25 ANSWER 64 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. Part 64. Preparation and properties of some mixed aminohydrazinoboranes
- L25 ANSWER 65 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Organoboron compounds. Communication 313. Synthesis of diiminoboranes and triiminoboranes
- L25 ANSWER 66 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Chemistry of boron. LXXVII. Synthesis of benzodiazaboroles
- L25 ANSWER 67 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Stereochemical rigidity and enantiomerization of

bis(diisopropylamino)dialkylaminoboranes

- L25 ANSWER 68 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI 1-Pyrrolylboranes and 1-pyrrolylborates
- L25 ANSWER 69 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Synthesis of diimino- and triiminoboranes
- L25 ANSWER 70 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Improved preparation of tris(organoamino)boranes
- L25 ANSWER 71 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI 2-Dialkylamino-1,3,2-diazaboracycloalkanes
- L25 ANSWER 72 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Gaseous bivalent borenium cations
- L25 ANSWER 73 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Organoboron compounds. CCLXXII. Preparation of
diphenylketiminoboranes from diphenylketimine hydrochloride and
dialkylaminoboranes
- L25 ANSWER 74 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Nuclear magnetic resonance studies of boron compounds. V. Boron-11
and nitrogen-14 NMR measurements of alkoxy-, alkylthio-, and
1-pyrrolylboranes
- L25 ANSWER 75 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Spectroscopic study of 1,3-dimethyl-2-(trimethylstannyl)-1,3-diaza-2-
boracycloalkanes
- L25 ANSWER 76 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Lewis basicity of 2-dimethylaminoborazine
- L25 ANSWER 77 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI New method for preparing ketiminoboranes
- L25 ANSWER 78 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Elimination-addition. XXI. Addition-dealkylation reactions of
acetylenic sulfonium salts with oxygen, sulfur, and nitrogen
nucleophiles
- L25 ANSWER 79 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Nuclear magnetic resonance studies on boron compounds. IV.
Nitrogen-14 nuclear magnetic resonance studies on simple
aminoboranes
- L25 ANSWER 80 OF 157 HCA COPYRIGHT 2005 ACS on STN

- TI Electronic structures of some tetrazaborolines and dimethyltetrazadieneiron tricarbonyl
- L25 ANSWER 81 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Stabilization of polyolefins
- L25 ANSWER 82 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Dehydrofluorination of primary amine-metalloid fluorides. IV. Reaction of primary amines or alcohols with silicon tetrafluoride in the presence of tertiary amines
- L25 ANSWER 83 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Medium ring compounds. VII. Synthesis of 2-methyl-7-oxoundecanolide, 8-oxoundecanolide, and 2,4,6-trimethyl-7-oxodecanolide
- L25 ANSWER 84 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Preparation and properties of tripyrrolylborane
- L25 ANSWER 85 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Organoboron compounds. CCXXX. Reaction of heptahydrodiborate ion and its trialkyl derivatives with anils
- L25 ANSWER 86 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Lithium and sodium trialkyltetrahydrodiborates
- L25 ANSWER 87 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI .alpha.-Olefin homopolymerization catalysts
- L25 ANSWER 88 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. XXXII. 2-Amino-1,3,2-diazaboracycloalkanes
- L25 ANSWER 89 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Reaction of enamino-boranes with nitriles
- L25 ANSWER 90 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Some organoboron compounds containing a bis(2-chloroethyl)amino group joined to boron
- L25 ANSWER 91 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Barriers to internal rotation in aminoboranes and in octamethyloxamidinium bromide
- L25 ANSWER 92 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Dehydrofluorination of amine-metalloid fluorides. III. The dehydrofluorination of primary amine-boron trifluoride adducts

- L25 ANSWER 93 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron chemosterilants against screwworm flies: structure-activity relation
- L25 ANSWER 94 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron compounds. XVIII. Boron-nitrogen compounds through aminolysis of triethylamine-borane and alkylidiboranes
- L25 ANSWER 95 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Hydrazine boranes and their pyrolysis products
- L25 ANSWER 96 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Tris(1-aziridinyl)boranes
- L25 ANSWER 97 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI The reaction of potassiopyrrole with boron compound of BA3 type
- L25 ANSWER 98 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Azomethine derivatives. VI. Action of diphenylketimine on diborane, trisdimethylaminoborane, trimethylborate, boron trifluoride and boron trichloride
- L25 ANSWER 99 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Azomethine derivatives. V. Reactions between organolithium compounds and diphenylketimine, some cyanides, and N,N,N',N'-tetramethylguanidine
- L25 ANSWER 100 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Monomeric diphenylketiminodiphenylborane, a boron nitrogen analog of an allene
- L25 ANSWER 101 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Decolorizing and prevention of discoloring of organic polyisocyanates
- L25 ANSWER 102 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Catalysts for .alpha.-olefin polymerization
- L25 ANSWER 103 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Preparing tris(N-alkylarylamino)borines from N-aryl amides
- L25 ANSWER 104 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Catalysts for stereospecific polymerization of olefins
- L25 ANSWER 105 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Chloroboration and allied reactions of unsaturated compounds. IV. Boration of di-p-tolylcarbodiimide

- L25 ANSWER 106 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Cyclic boron compounds. VIII. Amino- and hydrazino boranes and their cyclic dimers
- L25 ANSWER 107 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Tris(N-methylaryl-amino)boranes
- L25 ANSWER 108 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Modified organic polyisocyanates
- L25 ANSWER 109 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI The reaction of primary amines with boron halides. II. Arylamines. The effect of ortho-substitution: formation of di-.beta.-haloborazines
- L25 ANSWER 110 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Derivatives of cyclotetrazenoborane. II. Preparation and properties of dimethyl- and methylphenylcyclotetrazenoborane
- L25 ANSWER 111 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Simple synthesis of bis(diethylamino)boron chloride and its use for further syntheses
- L25 ANSWER 112 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Cyclic aminoborane compounds
- L25 ANSWER 113 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Benzoxazepines
- L25 ANSWER 114 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Aminodiazaboranes
- L25 ANSWER 115 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Oxygen-containing organotin and organolead. V. Preparation and bactericidal activity of tin and lead organic derivatives and their mixtures with quaternary ammonium salts
- L25 ANSWER 116 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron nitrogen chemistry. II. The ring cleavage of borazine by amines
- L25 ANSWER 117 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Steric effects in tris(N-boryl-2-pyridylamino)borane and its derivatives
- L25 ANSWER 118 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Photochemical reaction of tributylborane with 4,4'-bis(di-methylamino)benzothiophenone

- L25 ANSWER 119 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Synthesis of semisymmetrical tris(amides) of boric acid
- L25 ANSWER 120 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Chemistry of boron. XXX. Monomeric bis(dimethylamino) diethylphosphinoborane
- L25 ANSWER 121 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Tris(alkylamino)boranes
- L25 ANSWER 122 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Reaction of aliphatic orthoformates with tetrachlorogermane
- L25 ANSWER 123 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Amination of borate esters with diamines
- L25 ANSWER 124 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Solvolysis of amineboranes
- L25 ANSWER 125 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Interaction of phenyl isocyanate and related compounds with sodium borohydride
- L25 ANSWER 126 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Benzhydryl ethers
- L25 ANSWER 127 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boric acid triamides
- L25 ANSWER 128 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Preparation of some unsymmetrical tri-(amino)boranes
- L25 ANSWER 129 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Monomeric and polymeric aminoboranes
- L25 ANSWER 130 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI 7-Aminoalkoxy-3-ethyl-2,3-dihydro-2,2-dimethyl-1H-benz [e]-inden-1-ones and intermediates
- L25 ANSWER 131 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boron-nitrogen compounds. VIII. 2-Dimethylamino-1,3,2-benzodiazaboroline
- L25 ANSWER 132 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Tris(organoamino) boranes
- L25 ANSWER 133 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Trisamino boranes

L25 ANSWER 134 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Steric hindrance to replacement in boron trichloride

L25 ANSWER 135 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Preparation of some unsymmetrically substituted borazines

L25 ANSWER 136 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Direct preparation of some cyclic boron-nitrogen compounds from alkoxyboranes

L25 ANSWER 137 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Hydrolysis and exchange in esters of phosphoric acid

L25 ANSWER 138 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Reactions of triethyl thioborate with amines

L25 ANSWER 139 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Transamination of boron-nitrogen compounds

L25 ANSWER 140 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Cyclic organic boron compounds. V. Infrared spectra of borazoles and boroxoles

L25 ANSWER 141 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI A study of structures of lithium alcoholates by means of infrared absorption spectra. The O-Li. . .O bond

L25 ANSWER 142 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Substituted triaminoboranes

L25 ANSWER 143 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Aminoboranes

L25 ANSWER 144 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Kinetics and mechanism in the acid-catalyzed hydrolysis of orthoesters

L25 ANSWER 145 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Organic derivatives of boron. I. Synthesis by alcoholic interchange technique

L25 ANSWER 146 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI Infrared spectra of open-chain boron-nitrogen compounds

L25 ANSWER 147 OF 157 HCA COPYRIGHT 2005 ACS on STN

TI .omega.-Aldehydes of N-substituted .omega.-cyanomethyleneindoline

derivatives

- L25 ANSWER 148 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boric acid triamides
- L25 ANSWER 149 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Steric hindrance and assistance in displacement reactions of trivalent boron compounds
- L25 ANSWER 150 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Carbanilides
- L25 ANSWER 151 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boric acid reaction with isocyanates
- L25 ANSWER 152 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Organoboron compounds. XLV. Reaction of butyl esters of boric and organoboron acids with aromatic amines
- L25 ANSWER 153 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Cyclic organic boron compounds. IV. .beta.-Amino- and .beta.-alkoxyborazoles and their precursors the tris (primary amino) borons and (primary amino) boron alkoxides
- L25 ANSWER 154 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI A simple preparation of boron triamides from boron trifluoride etherates
- L25 ANSWER 155 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI The preparation of diphenyl fluorophosphate from the diphenyl chlorophosphate
- L25 ANSWER 156 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Boric acid triamides from boron fluoride
- L25 ANSWER 157 OF 157 HCA COPYRIGHT 2005 ACS on STN
TI Organoboron-nitrogen compounds. I. The reaction of boron chloride with aniline